OIPE IAP15
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JFW

PATENT
Atty. Docket No.PP018707.0002

I hereby certify that this correspondence is being deposited with the United States Postal Service with sufficient postage as first-class mail in an envelope addressed to: Mail Stop AMENDMENT, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on December 23, 2005.

By: _____

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	JAITNER and FANTL
Application No.	10/609,150
Filing Date:	June 25, 2003
Confirmation No.:	1248
Group Art Unit:	1623
Examiner:	Unassigned
Title:	SOS1 INHIBITOR

INFORMATION DISCLOSURE STATEMENT TRANSMITTAL

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Dear Sir:

Enclosed is an Information Disclosure Statement By Applicant and accompanying PTO/SB08B (formerly Form PTO-1449) for the above-identified patent application.

[X] In accordance with 37 C.F.R. §1.97(b), no additional fee for submission of the IDS is required.

[] In accordance with 37 C.F.R. §1.97(c), also enclosed is:

[] the fee of $180.00 as set forth in 37 C.F.R. 1.17(p); or

[] a statement as specified in 37 C.F.R. §1.97(e).

[] In accordance with 37 C.F.R. §1.97(d), a statement as specified in 37 C.F.R. §1.97 (e) and the fee of $180.00 as set forth in 37 C.F.R. §1.17(p) are also enclosed.

[] Check No. _____ in the amount of $_____ for total fee is attached.

[X] Communication to Accompany Information Disclosure Statement, including copy of letter from Andrew Chin and CD-ROM.

[X] A return receipt postcard is also enclosed.

[] Please charge $_____ to Deposit Account No. 03-1664 for the total fee. This paper is being submitted in duplicate.

The Commissioner for Patents is hereby authorized to charge any additional fees (or credit any overpayment) associated with this communication and which may be required under 37 CFR 1.16 and 1.17 to Deposit Account No. 03-1664.

Respectfully submitted,

By: _____
Julia R. Rosenthal
Reg. No. 54,410

Date: December 22, 2005

CHIRON CORPORATION
Intellectual Property Dept.
4560 Horton Street
Emeryville, CA 94608-2916
Telephone: (510) 923-8406
Facsimile: (510) 655-3949

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Group Art Unit:	1623
Examiner:	Unassigned
Title:	SOS1 INHIBITOR

COMMUNICATION TO ACCOMPANY INFORMATION DISCLOSURE STATEMENT

Mail Stop AMENDMENT
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

Pursuant to 37 C.F.R. § 1.97, Applicant brings to the attention of the Examiner the following information:

"On the Preparation and Utilization of Isolated and Purified Oligonucleotides" by Andrew Chin, Esq.

This information is listed on the attached PTO Form SB/08B, formerly known as PTO Form 1449, submitted herewith. Included with this submission are a letter and CD-ROM sent to Applicant's

attorney by Andrew Chin, Esq. A copy of Mr. Chin's letter is enclosed for the purposes of full disclosure but nothing stated by Mr. Chin should be taken to be a position of Applicant in any respect. Applicant notes that the largest file on the CD-ROM has not been viewed by the Applicant because, as anticipated by Mr. Chin, due to the size of the file, Applicant is unable to view or print the file.

Inclusion of the information submitted herewith should not be construed as an admission that the information cited is, or is considered to be, material to patentability or that the information constitutes prior art. Further, Applicant has not conducted a review to establish if or when the information cited herein was made publicly available. Applicant understands the Examiner will make an independent evaluation of the cited information. This information is submitted only out of an abundance of caution.

In accordance with 37 C.F.R. § 1.97(g), the filing of this Information Disclosure Statement shall not be construed to mean that a search has been made.

The Commissioner for Patents is hereby authorized to charge any additional fees (or credit any overpayment) associated with this communication and which may be required under 37 CFR 1.16 and 1.17 to Deposit Account No. 03-1664.

Respectfully submitted,

By: 
Julia R. Rosenthal
Reg. No. 54,410

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Substitute for form 1449B/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 1 of 1

Complete if Known	
Application Number	10/609,150
Filing Date	06-25-2003
First Named Inventor	Birgit K. Jaitner
Art Unit	1623
Examiner Name	Unassigned
Attorney Docket Number	PP018707.0002

NON PATENT LITERATURE DOCUMENTS

Examiner Initials *	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T [2]
	CA	CHIN, Andrew, CD-ROM document, entitled "On the Preparation and Utilization of Isolated and Purified Oligonucleotides," including copy of letter, dated May 12, 2005 from Andrew Chin	

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.
[1] Applicant's unique citation designation number (optional). [2] Applicant is to place a check mark here if English language Translation is attached.
This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

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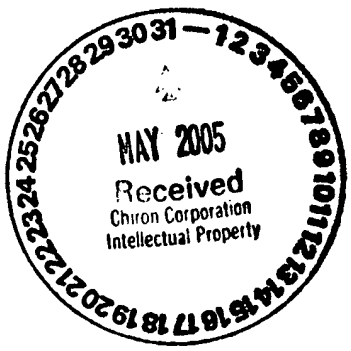
May 12, 2005

Re: U.S. Patent Application No. 10/609,150
Birgit Jaitner, "Sos1 inhibitors,"
Attorney Docket No. PP-18707.002



Dr. Birgit Jaitner, Inventor
c/o Chiron Corporation
Intellectual Property Department – R440
P.O. Box 8097
Emeryville, CA 94662-8097

Dear Dr. Jaitner:

I am writing to call your attention to a printed publication that may constitute material prior art with respect to the above-referenced patent application.

Enclosed please find a copy of a CD-ROM document entitled "On the preparation and utilization of isolated and purified oligonucleotides," which I produced on March 9, 2002 and contributed to the public collection of the Kathrine R. Everett Law Library of the University of North Carolina on March 14, 2002.

For your convenience, I have also enclosed a hard copy of the initial portion of the text file stored on that CD-ROM. As you can ascertain from that excerpt, the CD-ROM reference contains a full written description of several million oligonucleotides of between 8 and 12 nucleotides in length inclusive, together with methods of making and using each.

I believe that the reference is material prior art at least with respect to one or more claims of the above-referenced application. Accordingly, I would recommend that the attorney or agent handling this application promptly disclose this reference to the Patent Office. As a courtesy, I would appreciate a written acknowledgement that he or she has done so.

Please note that I am writing regarding my own work and that I am not thereby representing The University of North Carolina or The University of North Carolina School of Law. If you wish to discuss this matter, I can be reached at the above phone number or by email at chin@unc.edu.

Sincerely yours,

Andrew Chin

Andrew Chin
Associate Professor

DOCKETED on/by 5/31/05 CAL
Atty. CAL PA
File # PP018707.0002
Due Date _____ Ext _____

On the Preparation and Utilization of Isolated and Purified Oligonucleotides

Andrew Chin
The University of North Carolina School of Law
March 9, 2002

The term "isolated" as used herein refers to a nucleotide sequence that has been manually produced and is separated from its native, in vivo, cellular environment and is present in the substantial absence of other biological molecules of the same type. The term "purified" as used herein for nucleotide sequences preferably means lacking significant quantities of other biological macromolecules of the same type (but water, buffers, and other small molecules, can be present).

Preparation of Isolated and Purified Oligonucleotides

As described in U.S. Patent No. 5,808,022 (issued Sept. 15, 1998) (William D. Huse), oligonucleotide synthesis proceeds via linear coupling of individual monomers in a stepwise reaction. The reactions are generally performed on a solid phase support by first coupling the 3' end of the first monomer to the support. The second monomer is added to the 5' end of the first monomer in a condensation reaction to yield a dinucleotide coupled to the solid support. At the end of each coupling reaction, the by-products and unreacted, free monomers are washed away so that the starting material for the next round of synthesis is the pure oligonucleotide attached to the support. In this reaction scheme, the stepwise addition of individual monomers to a single, growing end of an oligonucleotide ensures accurate synthesis of the desired sequence. Moreover, unwanted side reactions are eliminated, such as the condensation of two oligonucleotides, resulting in high product yields.

Oligonucleotides are constructed by conventional procedures such as those described in J. Sambrook et al., Molecular Cloning: A Laboratory Manual 10.42-.46 (3rd ed. 2001); K. Itakura et al., Synthesis and Use of Synthetic Oligonucleotides, 53 Ann. Rev. Biochemistry 323 (1984); M.D. Matteucci & M.H. Caruthers, Synthesis of Deoxynucleotides on a Polymer Support, 103 J. Am. Chem. Soc'y 3185 (1981); S.A. Narang, DNA Synthesis, 39 Tetrahedron 3 (1983). Oligonucleotide chains up to about 70 nucleotide residues long are preferably synthesized on automated synthesizers well known in the art (such as the Beckman Oligo 1000 or the Applied Biosystems ABI 392 DNA Synthesizer). Present-day DNA synthesizers are so efficient that oligonucleotides up to about 25 nucleotides in length generally do not contain significant quantities of truncated DNA fragments and hence do not require purification by gel electrophoresis. If necessary, however, purification of synthetic oligonucleotides can be achieved by one of several methods, as described in J. Sambrook, supra, at 10.48-49; including denaturing polyacrylamide gel electrophoresis, as described in J. Sambrook, supra, at 10.11-.16; T. Atkinson & M. Smith, Solid-Phase Synthesis of Oligodeoxyribonucleotides by the Phosphate-Triester Method, in Oligonucleotide Synthesis: A Practical Approach 35-82 (M.J. Gait ed. 1984).

Utilization of Oligonucleotides

As described in U.S. Patent No. 6,316,191 (issued Nov. 13, 2001) (Radoje T. Drmanac), hybridization depends on the pairing of complementary bases in nucleic acids and is a specific tool useful for the general recognition of informational polymers. Diverse research problems using hybridization of a synthetic oligonucleotide of known sequence include, amongst others, the different techniques of identification of specific clones from CDNA and genomic libraries, detecting single base pair polymorphisms in DNA, generation of mutations by oligonucleotide mutagenesis, and the amplification of nucleic acids in vitro from a single sperm, an extinct organism, or a single virus infecting a single cell.

Synthetic oligonucleotides of arbitrary nucleotide sequence are utilized in biological research, wherein oligonucleotides of specified length and random nucleotide sequence are synthesized using known procedures such as those described in Huse, supra; U.S. Patent No. 5,639,595 (issued June 17, 1997) (Christopher K. Mirabelli et al.). Arbitrary oligonucleotide primers of specified length may be used in the synthesis of cDNA probes from mRNA as described in Sambrook, supra, at 9.38-.40; J.G. Williams et al., DNA Polymorphisms Amplified By Arbitrary Primers Are Useful As Genetic Markers, 18 Nucleic Acids Research 6531 (1990), in the systematic evolution of ligands by exponential enrichment as described in U.S. Patent No. 6,331,398 (issued Dec. 18, 2001) (Larry Gold & Craig Tuerk); C. Tuerk & L. Gold, Systematic Evolution of High-Affinity RNA Ligands of Bacteriophage T4 DNA Polymerase in Vitro, 249 Science 505 (1990), and in sequencing by hybridization as described in Drmanac, supra. Preferably, oligonucleotide primers and probes are characterized by sequences of 8 to 20 nucleotides that have moderate G+C content, are free of homopolymeric runs and directly or inversely repeated regions.

The disclosures of all publications and patents set forth hereinbefore are expressly incorporated herein by reference.

Sequence Listing

The listing of sequences set forth hereinafter consists of all sequences of 8 to 12 nucleotides that have between 40 and 60 percent G+C content and are free of homopolymeric runs of 4 or more bases and directly or inversely repeated regions of 4 or more bases. Based on the the disclosures herein and the knowledge of a person of ordinary skill in the art, it will be apparent to such a person how to make and use an isolated and/or purified oligonucleotide characterized by any of the following nucleotide sequences: